

**RECEIVED
CENTRAL FAX CENTER****AUG 31 2006**

App. Serial No. 09/877,724
Docket No. STFD.059PA
Office Action Response AF

In the Specification:

Please insert the following new paragraph below paragraph line [0190] as follows:

The following table shows an example flowchart commensurate with the foregoing discussion. As illustrated in FIG. 17, one approach for controlling a digital communication system having a plurality of data-carrying communication lines having the available total power for use in the system limited by a power constraint is implemented as follows:

As depicted by block 1700, the total power constraint for each line is assigned an initial value. As depicted by block 1702, a competitively optimal data rate is determined for each line. According to one example embodiment, the competitively optimal data rate is determined by performing the steps of: determining a power allocation within the total power constraint of each line by iteratively allowing each line to optimize its power allocation as detected in block 1701, and determining the competitively optimal data rate for each line based on the determined power allocation for the line in block 1702. As depicted by block 1703, a model of the line, signal and the actual interference characteristics of the communication lines is created. As depicted by block 1704, signals are processed using the model to remove interference from signals including evaluating the competitively optimal data rate for each line. According to one example embodiment, the signals are processed by performing the steps of: comparing the competitively optimal data rate of a line with a target rate for the line as depicted in block 1705; increasing the power constraint for a line if the competitively optimal data rate of the line is less than the target rate for the line as depicted in block 1706; decreasing the power constraint for the line if the competitively optimal data rate of the line exceeds the target rate for the line by at least a prescribed variance as depicted in block 1708; maintaining the power constraint for the line if the competitively optimal data rate of the line is equal to the target rate for the line; and maintaining the power constraint for the

App. Serial No. 09/877,724
Docket No. STFD.059PA
Office Action Response A1

line if the competitively optimal data rate of the line exceeds the target rate for the line by less than the prescribed variance as depicted in block 1707.

Please insert the following new paragraph below paragraph line [0058] as follows:

Figure 17 is a flow diagram representation of one embodiment of the present invention in which power levels are determined.